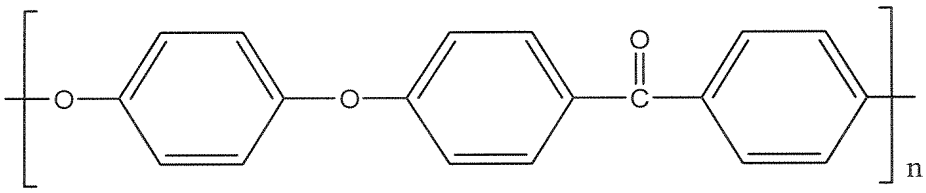
IN THE CLAIMS

Please amend the claims as follows:

Claims 1-30 Canceled

Claim 31 (Previously Presented): A powder comprising essentially spherical particles of an aromatic polyether ketone plastic.

Claim 32 (Previously Presented): The powder of Claim 31, wherein the aromatic polyether ketone plastic is a polyaryl ether ketone plastic comprising polymerized units of oxy-1,4-phenylene-oxy-1,4-phenylene-carbonyl-1,4-phenylene of formula (I)



(I)

Claim 33 (Previously Presented): The powder of Claim 31, wherein the particles are spherical.

Claim 34 (Previously Presented): The power according to Claim 1, further comprising one or more of a stiffening fiber or a reinforcing fiber, and a matrix material in the form of essentially spherical powder particles.

Claim 35 (Previously Presented): The powder according to Claim 34, wherein the total amount of the stiffening fibers and reinforcing fibers is up to 25% by volume.

Claim 36 (Previously Presented): The powder according to Claim 34, wherein the total amount of the stiffening fibers and reinforcing fibers is up to 15% by volume.

Claim 37 (Previously Presented): The powder of Claim 34, wherein the total amount of the stiffening fibers and reinforcing fibers is up to 10% by volume.

Claim 38 (Previously Presented): The powder according to Claim 34, wherein the fibers are embedded in the aromatic polyether ketone plastic.

Claim 39 (Previously Presented): The powder according to Claim 34, wherein the fibers are essentially completely surrounded by the aromatic polyether ketone plastic.

Claim 40 (Previously Presented): The powder according to Claim 34, wherein the reinforcing fibers and stiffening fibers are completely surrounded by the aromatic polyether ketone plastic.

Claim 41 (Previously Presented): The powder according to Claim 38, wherein the reinforcing fibers and stiffening fibers are present in a volume proportion of greater than 15%.

Claim 42 (Previously Presented): The powder according to Claim 38, wherein the stiffening fibers and reinforcing fibers are present in a volume proportion of greater than 25%.

Claim 43 (Previously Presented): The powder according to Claim 34, wherein the matrix material comprises a thermoplastic material.

Claim 44 (Currently Amended): The powder according to Claim 43, wherein the matrix material comprises a ~~crosslinked~~ polyamide.

Claim 45 (Currently Amended): The powder according to Claim 44, wherein ~~the crosslinked~~ said polyamide is at least one selected from the group consisting of PA11 and PA12.

Claim 46 (Previously Presented): The powder according to Claim 43, wherein at least one of the stiffening fibers or reinforcing fibers comprises at least one of carbon or glass fibers.

Claim 47 (Previously Presented): The powder according to Claim 31, wherein the spherical particles have an average grain sized d_{50} of from 20 to 150 μm.

Claim 48 (Previously Presented): The powder according to Claim 31, wherein the spherical powder particles have an average grain size d_{50} of from 40 to 70 μm.

Claim 49 (Previously Presented): The powder according to Claim 34, wherein the matrix material comprises a metallic material.

Claim 50 (Previously Presented): The powder according to Claim 51, wherein the fibers are selected from the group consisting of ceramic fibers and boron fibers.

Claim 51 (Previously Presented): The powder according to Claim 49, wherein the spherical powder particles have an average grain size d_{50} in the range of 10 to 100 μm.

Claim 52 (Previously Presented): The powder according to Claim 49, wherein the spherical powder particles have an average grain size d_{50} of from 10 to 80 μm.

Claim 53 (Previously Presented): The powder according to Claim 34, wherein the average length L50 of the fibers is no greater than the average grain size d_{50} of the spherical powder particles.

Claim 54 (Previously Presented): A powder comprising a first component in the form of essentially spherical powder particles and at least one of a stiffening fiber or a reinforcing fiber, wherein the first component comprises a matrix material.

Claim 55 (Previously Presented): The powder according to Claim 54, wherein the total amount of the stiffening fibers and reinforcing fibers is up to 25% by volume.

Claim 56 (Previously Presented): The powder according to Claim 54, wherein the total amount of the stiffening fibers and reinforcing fibers is up to 15% by volume.

Claim 57 (Previously Presented): The powder of Claim 54, wherein the total amount of the stiffening fibers and reinforcing fibers is up to 10% by volume.

Claim 58 (Previously Presented): The powder according to Claim 54, wherein the fibers are embedded in the aromatic polyether ketone plastic.

Claim 59 (Previously Presented): The powder according to Claim 54, wherein the fibers are essentially completely surrounded by the aromatic polyether ketone plastic.

Claim 60 (Previously Presented): The powder according to Claim 54, wherein the reinforcing fibers and stiffening fibers are completely surrounded by the aromatic polyether ketone plastic.

Claim 61 (Previously Presented): The powder according to Claim 58, wherein the reinforcing fibers and stiffening fibers are present in a volume proportion of greater than 15%.

Claim 62 (Previously Presented): The powder according to Claim 58, wherein the stiffening fibers and reinforcing fibers are present in a volume proportion of greater than 25%.

Claim 63 (Previously Presented): The powder according to Claim 54, wherein the matrix material comprises a thermoplastic material.

Claim 64 (Currently Amended): The powder according to Claim 63, wherein the thermoplastic material comprises a ~~crosslinked~~ polyamide.

Claim 65 (Currently Amended): The powder according to Claim 64, wherein ~~the crosslinked~~ said polyamide is at least one selected from the group consisting of PA11 and PA12.

Claim 66 (Previously Presented): The powder according to Claim 63, wherein at least one of the stiffening fibers or reinforcing fibers comprises at least one of carbon or glass fibers.

Claim 67 (Previously Presented): The powder according to Claim 54, wherein the spherical particles have an average grain sized d_{50} of from 20 to 150 μm.

Claim 68 (Previously Presented): The powder according to Claim 54, wherein the spherical powder particles have an average grain size d_{50} of from 40 to 70 μm.

Claim 69 (Previously Presented): The powder according to Claim 54, wherein the matrix material comprises a metallic material.

Claim 70 (Previously Presented): The powder according to Claim 69, wherein the fibers are selected from the group consisting of ceramic fibers and boron fibers

Claim 71 (Previously Presented): The powder according to Claim 69, wherein the spherical powder particles have an average grain size d_{50} in the range of 10 to 100 μm.

Claim 72 (Previously Presented): The powder according to Claim 69, wherein the spherical powder particles have an average grain size d_{50} of from 10 to 80 μm.

Claim 73 (Previously Presented): A method for the production of a powder comprising essentially spherical particles of an aromatic polyether ketone plastic, comprising:

mixing a matrix micropowder into a liquid phase to form a suspension wherein the particle size of the matrix micropowder is less than the particle size of the powder;

spraying the suspension through a nozzle to form droplets comprising the matrix micropowder; and

vaporizing or evaporating a liquid component from the droplets to form the powder in the form of essentially spherical agglomerates.

Claim 74 (Previously Presented): The method according to Claim 73, wherein the liquid phase is further mixed with at least one of a reinforcing fiber or a stiffening fiber having a length less than the particle size of the powder.

Claim 75 (Previously Presented): The method according to Claim 73, wherein the matrix micropowder has an average grain size d_{50} between 3 and 10 μm.

Claim 76 (Previously Presented): The method according to Claim 73, wherein the matrix micropowder has an average grain size d_{50} of 5 μm.

Claim 77 (Previously Presented): The method of Claim 74, wherein the fibers have an average length L50 of 20 to 150 μm.

Claim 78 (Previously Presented): The method according to Claim 74, wherein the fibers have an average length L50 of 40 to 70 μm.

Claim 79 (Previously Presented): The method according to Claim 74, wherein the matrix micropowder has an average grain size d_{50} between 3 and 10 μm and the fibers have an average length L50 of 10 to 100 μm.

Claim 80 (Previously Presented): The method according to Claim 74, wherein the matrix micropowder has an average grain size d_{50} of 5 μm and the fibers have an average length L50 of 10 to 80 μm.

Claim 81 (Previously Presented): The method according to Claim 73, wherein the droplets have an average diameter d_{50} of 10 to 70 μm.

Claim 82 (Previously Presented): The method according to Claim 73, wherein the vaporizing or evaporating is carried out while the droplets are moving through a heating segment.

Claim 83 (Previously Presented): A method for the production of a powder comprising a first component in the form of essentially spherical powder particle and at least one of a stiffening fiber or a reinforcing fiber, wherein the first component comprises a matrix material, and the fibers are embedded in the powder particles, comprising:

mixing a matrix micropowder with a liquid phase to form a suspension wherein the particle size of the matrix micropowder is less than the particle size of the powder;

spraying the suspension through a nozzle to form droplets comprising the matrix micropowder; and

vaporizing or evaporating a liquid component from the droplets to form the powder in the form of essentially spherical agglomerates.

Claim 84 (Previously Presented): The method according to Claim 83, wherein the liquid phase is further mixed with at least one of a reinforcing fiber or a stiffening fiber having a length less than the particle size of the powder.

Claim 85 (Previously Presented): The method according to Claim 83, wherein the matrix micropowder has an average grain size d_{50} between 3 and 10 μm.

Claim 86 (Previously Presented): The method according to Claim 83, wherein the matrix micropowder has an average grain size d_{50} of 5 μm.

Claim 87 (Previously Presented): The method of Claim 83, wherein the fibers have an average length L50 of 20 to 150 μm.

Claim 88 (Previously Presented): The method according to Claim 83, wherein the fibers have an average length L50 of 40 to 70 μm.

Claim 89 (Previously Presented): The method according to Claim 84, wherein the matrix micropowder has an average grain size d_{50} between 3 and 10 μm and the fibers have an average length L50 of 10 to 100 μm.

Claim 90 (Previously Presented): The method according to Claim 84, wherein the matrix micropowder has an average grain size d_{50} of 5 μm and the fibers have an average length L_{50} of 10 to 80 μm.

Claim 91 (Previously Presented): The method according to Claim 83, wherein the droplets have an average diameter d_{50} of 10 to 70 μm.

Claim 92 (Previously Presented): The method according to Claim 83, wherein the vaporizing or evaporating is carried out while the droplets are moving through a heating segment.

Claim 93 (Previously Presented): A method for the production of a powder comprising essentially spherical particles of an aromatic polyether ketone plastic, comprising:

cooling a coarse granulate comprising a plastic matrix material to form brittle, coarse granulates;

grinding the brittle, coarse granulates; and

separating the ground granulate into a fraction spectrum.

Claim 94 (Previously Presented): The method according to Claim 93, wherein the coarse granulate is a fiber-reinforced plastic matrix material.

Claim 95 (Previously Presented): The method according to Claim 93, wherein the grinding is carried out with a pinned disk mill.

Claim 96 (Previously Presented): The method according to Claim 93, wherein the grinding is carried out with cooling.

Claim 97 (Previously Presented): The method according to Claim 93, wherein the separating is carried out with an air separator.

Claim 98 (Previously Presented): The method according to Claim 93, further comprising:

smoothing the ground granulate.

Claim 99 (Previously Presented): The method according to Claim 98, wherein the smoothing is carried out by embedding or accumulating at least one of microparticles or nanoparticles.

Claim 100 (Previously Presented): A method for producing a powder comprising a first component in the form of essentially spherical powder particles and at least one of a stiffening fiber or a reinforcing fiber, wherein the first component comprises a matrix material, comprising:

cooling a coarse granulate comprising a plastic matrix material to form brittle, coarse granulates;

grinding the brittle, coarse granulates; and

separating the ground granulate into a fraction spectrum.

Claim 101 (Previously Presented): The method according to Claim 100, wherein the coarse granulate is a fiber-reinforced plastic matrix material.

Claim 102 (Previously Presented): The method according to Claim 100, wherein the grinding is carried out with a pinned disk mill.

Claim 103 (Previously Presented): The method according to Claim 100, wherein the grinding is carried out with cooling.

Claim 104 (Previously Presented): The method according to Claim 100, wherein the separating is carried out with an air separator.

Claim 105 (Previously Presented): The method according to Claim 100, further comprising:

smoothing the ground granulate.

Claim 106 (Previously Presented): The method according to Claim 105, wherein the smoothing is carried out by embedding or accumulating at least one of microparticles or nanoparticles.

Claim 107 (Previously Presented): A method for producing a powder comprising essentially spherical particles of an aromatic polyether ketone plastic, comprising:

melting a matrix material;

blowing the melted matrix material through a nozzle to form droplets; and

passing the droplets through a cooling segment.

Claim 108 (Previously Presented): The method according to Claim 107, further comprising:

stirring at least one of stiffening fibers or reinforcing fibers into the melted matrix material before blowing the melted matrix material.

Claim 109 (Previously Presented): The method according to Claim 107, wherein the droplets are formed in a hot gas jet.

Claim 110 (Previously Presented): The method according to Claim 107, further comprising:

separating the cooled droplets into a fraction spectrum.

Claim 111 (Previously Presented): A method for producing a powder comprising a first component in the form of essentially spherical powder particles and at least one of a stiffening fiber or a reinforcing fiber, wherein the first component comprises a matrix material, comprising:

melting a matrix material;

blowing the melted matrix material through a nozzle to form droplets; and

passing the droplets through a cooling segment.

Claim 112 (Previously Presented): The method according to Claim 111, further comprising:

stirring at least of stiffening or reinforcing fibers into the melted matrix material before blowing the melted matrix material.

Claim 113 (Previously Presented): The method according to Claim 111, wherein the droplets are formed in a hot gas jet.

Claim 114 (Previously Presented): The method according to Claim 111, further comprising:

separating the cooled droplets into a fraction spectrum.

Claim 115 (Previously Presented): A method for producing a spatial structure, comprising:

melting the powder according to Claim 31.

Claim 116 (Previously Presented): The method according to Claim 115, wherein melting includes powder-based generative rapid prototyping, selective laser sintering or laser melting.

Claim 117 (Previously Presented): A method for producing a spatial structure, comprising:

melting the powder according to Claim 34.

Claim 118 (Previously Presented): The method according to Claim 117, wherein melting includes powder-based generative rapid prototyping, selective laser sintering or laser melting.

Claim 119 (Previously Presented): A molded body obtained by powder-based generative rapid prototyping of the powder according to Claim 31.

Claim 120 (Previously Presented): The molded body of Claim 119, wherein the powder-based generative rapid prototyping is selective laser sintering or laser melting.

Claim 121 (Previously Presented): A molded body obtained by powder-based generative rapid prototyping of the powder according to Claim 34.

Claim 122 (Previously Presented): The molded body of Claim 121, wherein the powder-based generative rapid prototyping is selective laser sintering or laser melting.

Claim 123 (Previously Presented): The molded body according to Claim 119, comprising one or more interior reinforcements.

Claim 124 (Previously Presented): The molded body according to Claim 119, comprising a three-dimensional framework reinforcement.

Claim 125 (Previously Presented): The molded body according to Claim 121, comprising one or more interior reinforcements.

Claim 126 (Previously Presented): The molded body according to Claim 121, comprising a three-dimensional framework reinforcement.

Claim 127 (Previously Presented): A molded body obtained by powder-based generative rapid prototyping of the powder according to Claim 54.

Claim 128 (Previously Presented): The molded body of Claim 127, wherein the powder-based generative rapid prototyping is selective laser sintering or laser melting.

Claim 129 (Previously Presented): The molded body according to Claim 128, comprising one or more interior reinforcements.